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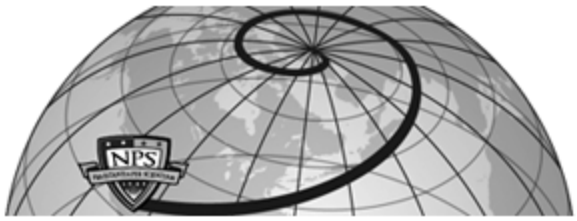

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AN OVERVIEW OF

ALTERNATE DISPUTE RESOLUTION USE

IN THE CONSTRUCTION INDUSTRY

by

Matthew Patrick Tucker, B.S., P.E.

Report

Presented to the Faculty of the Graduate School

of The University of Texas at Austin

in Partial Fulfillment

of the Requirements

for the Degree of

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AN OVERVIEW OF

ALTERNATE DISPUTE RESOLUTION USE

IN THE CONSTRUCTION INDUSTRY

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AN OVERVIEW OF
ALTERNATE DISPUTE RESOLUTION USE
IN THE CONSTRUCTION INDUSTRY

by

Matthew Patrick Tucker, M.S.E

The University of Texas at Austin, 2005

SUPERVISOR: John D. Borcherding

This report provides an overview of alternate dispute resolution and its use in the construction industry. An overview of the U.S. legal system is provided as a basis for dispute resolution. Caseload and litigation trends in U.S. courts are discussed. An overview of the various types of alternate dispute resolution and use by Fortune 1000 companies and the U.S. government is provided. Specific considerations of alternate dispute resolution in the construction industry are discussed. The report concludes with case studies from an actual construction mediation and arbitration.

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Chapter 1: Introduction

1.1 Purpose

Construction projects are complex. They require the participation of numerous individuals with a wide range of education and skills. From the laborer, craftsman, foreman, and superintendent, to the project manager, architect, and engineer, to the owner and their representatives, and to the inspectors and regulators, everyone has a role. Unfortunately, with so many participants employed in numerous trades and professions, some disagreements and disputes are inevitable. The U.S. legal system affords the opportunity for those disputes that are not resolved within the project organization to be resolved in a court of law. This form of dispute resolution is called litigation. Considering the complexity of construction projects, which usually involve many disputes, and the opportunity to litigate those disputes in court, it is no wonder the construction industry has a reputation for being litigious.

While litigation is an option for resolving construction disputes, it is typically the most expensive, time-consuming, and arguably least effective method of dispute resolution. Exorbitant amounts of money are spent on fees for attorneys, expert witnesses, and discovery. In addition, having a case heard and resolved in court can take years. The effectiveness of litigation can be questioned because those deciding the case, either the judge or jury, are so far removed from

actual events. Add to this the likelihood that an appeal will be filed by the losing side after a decision is rendered. It is easy to conclude there must be a more efficient way to resolve disputes. Fortunately, Alternate Dispute Resolution, commonly referred to as 'ADR', is cheaper, quicker, and more efficient.

1.2 Objectives

The primary objective of this report is to review of the use of alternate dispute resolution in the construction industry. This is accomplished as follows:

1. Common perception is that Americans are litigious people and our courts are overburdened with lawsuits. The first objective of this report is to evaluate this perception and develop a sense of the opportunity for ADR use.
2. Various methods of ADR are available. The second objective of this report is to review the methods, their use, and potential cost savings compared to litigation.
3. Since construction is complex, certain ADR methods may be more effective in resolving construction disputes. The third objective is to review what experts say and recommend regarding aspects of construction dispute ADR.
4. The fourth objective is to review case studies of actual ADR use in construction disputes.

1.3 Methodology

A literature review was the primary means of gathering information and data for the report. References include books on dispute resolution, articles from both legal and construction trade journals, and various web sites. There were three primary sources of data in the report. These include the National Center for State Courts annual reports on workload in state courts, a survey on the use of ADR by major corporations conducted by Cornell University and the Foundation for the Prevention and Early Resolution of Conflicts, and several ADR surveys by Deloitte and Touche.

1.4 Report Structure

The report starts in Chapter 2 with a review of the U.S. legal system which offers all Americans the opportunity to settle their disputes in the courtroom. Absent of our laws and courts, alternate dispute resolution would not exist.

Chapter 3 covers the current caseload in the U.S. courts at both the federal and state levels. State court filing and litigation trends are reviewed.

Chapter 4 gives a broad description of various types of ADR. In addition, the use of ADR by Fortune 1000 companies and the U.S. Government is analyzed. Finally, the chapter covers expected cost savings of ADR compared to litigation.

Chapter 5 discusses the use of ADR in the construction industry. The uniqueness of construction disputes and the most commonly used methods of construction ADR are discussed.

Chapter 6 is a review of two case studies in construction ADR. One case used mediation and the other arbitration.

The report concludes in Chapter 7 with a summary of the report findings.

Chapter 2: Review of the U.S. Legal System

2.1 Historical Foundation

Throughout recorded history numerous people have lived in societies under various sets of rules, laws, and legal systems. While the laws and systems of justice themselves are quite diverse, there is a common element of a body of rules prescribed by a controlling authority to govern social order (Abadinsky, 1988).

One of the earliest recorded sets of laws governing a society can be found in the Bible. Moses was the God appointed leader of the Isrealites who led them out of Egypt from slavery. While the Isrealites were wandering in the desert, Moses went to the top of Mount Sinai and brought back the Ten Commandments. The Ten Commandments were God's written law to the Isrealites on various religious and societal issues. As with all societies throughout history, people made a decision on whether or not to comply with the law. Some Isrealites abided by the Commandments while others chose to break them. Therefore, the Bible also records some of the earliest rebellion against law.

With the United States' historical link to England, a great deal of American law is based on the English legal system. One major part of the British system adopted by the U.S. is the common law tradition which originated in medieval times (Jentz & Miller, 1994). Prior to the common law system, disputes

in England were settled according to local laws. The common law system attempted to establish a uniform set of laws for the entire country. When a judge would make a decision, they would attempt to be consistent with prior decisions made by other judges. Each ruling or interpretation would become a precedent and later cases of a similar nature would be settled with consideration to the prior judges' decision. Many English common law decisions were observed in colonial America and played a part in establishing new laws of the United States.

2.2 Sources of U.S. Law

2.2.1 Constitutional Law

The U.S Constitution is the supreme law of the land. Any law, whether federal or state, found to be in violation of the Constitution will be overruled and not enforced. States have their own individual constitutions which are supreme within their borders.

2.2.2 Statutory Law

Statutory laws are enacted by the U.S. Congress, or state and local legislative bodies. This type of law is also called legislation. Since congressmen and congresswomen hold their offices as a result of popular vote, legislation is believed to reflect the attitudes of the represented people. Lawmakers who vote

against the will of their constituents will likely be removed from office during the next election cycle (Schneier & Sweet, 2004).

2.2.3 Common Law/Case Law

As previously indicated, English precedent law or common/case-law is a significant source of American law. The practice of stare decisis, which means to stand on decided cases, is a significant cornerstone of the present U.S. legal system (Jentz & Miller, 1994). However, case law decisions can not overrule current statutory laws.

2.2.4 Administrative Law

This body of law is created by administrative agencies which have specific authority to make and enforce rules relating to the purpose of their agency. For example, the Securities and Exchange Commission can make rules governing securities transactions, and the Occupational Safety and Health Administration can make rules governing workplace safety. However, agencies do not have unlimited authority and they can not exceed the power given to them for their established purpose.

2.3 Criminal versus Civil Law

In the United States an extremely important distinction is made between criminal and civil cases. A criminal case results from someone committing a crime. A crime is an act considered so reprehensible that it is considered a wrong against the state or society as a whole, as well as against the individual victim (Jentz & Miller, 1994). Crimes are prosecuted by a public official and not the victim. Those who commit crimes are punished rather than made to compensate the victim.

Civil law and civil cases pertain to duties and disputes which exist between people (Jentz & Miller, 1994). In civil cases injured persons seek redress or compensation from the other party. For example, civil cases are used as a means to resolve disputes involving accidents resulting from negligence, libel, and construction contract disputes. Violations of civil law are not considered to be crimes; however, some crimes can be dealt with from both a criminal and civil perspective.

2.4 U.S. Court Systems

There are two primary court systems in the United States, the federal system and the states' systems. In order to determine if a case will be heard in a federal court or state court, jurisdiction must be established. The American Heritage Dictionary defines jurisdiction as the "the right and power to interpret

and apply the law." In order to hear a case, a court must have jurisdiction over the people or property involved, as well as the subject matter (Jentz & Miller, 1994).

Federal courts hear cases where the subject matter involves federal jurisdiction. For example, if the case involves the U.S. Constitution, federal law, or crosses state lines then it would be heard in a federal court. On the other hand, when the case involves a matter pertaining to a single state, then it will be heard in state court.

Chapter 3: Caseload in U.S. Courts

3.1 Annual Federal and State Court Filings

The National Center for State Courts (2002) reports from 1984 through 2001 there were in excess of 90 million annual federal and state court fillings. State filings each year account for approximately 97%-98% of the total. Table 1 shows federal and state court filing data for 2001. The majority of the filings, 97.2%, were in state courts.

Table 1. Federal and State Court Filings, 2001 (NCSC, 2002)

		Filings
Federal Courts	Criminal	62,708
	Civil	250,907
	Bankruptcy	1,437,354
	Magistrates	873,948
	Total:	2,624,917
State Courts	Criminal	14,054,945
	Civil	15,792,277
	Domestic	5,300,114
	Juvenile	1,997,403
	Traffic	55,685,616
	Total:	92,830,355
	W/O Traffic Total:	37,144,739

While traffic cases are the largest share of state court filings, they are arguably the least burden on a court. Traffic court is conducted in mass session and many people choose to pay their citations without a formal trial. However, even without consideration of traffic related filings, state courts still handle the bulk of total cases filed. Not including traffic filings, state courts handled 93.4% of the total cases filed in 2001.

3.2 State Court Filing Trends

While criminal filings are a function of crimes committed and a need to take appropriate action to protect society, civil filings involve more freewill and choice. Arguably most Americans would agree criminals should be punished for their crimes. Occasionally the media will cover a story where someone is prosecuted for a crime unjustly; however, that is not the norm.

On the other hand, there is a perception in America that civil lawsuit filings are out of control. We frequently hear from the media about cases deemed newsworthy such as overweight people suing McDonalds for serving food with a high fat content. Recently the media has covered stories of doctors who are no longer delivering babies due to potential medical malpractice suits. As a matter of fact, this issue is so contentious that medical lawsuit reform is an agenda item for President Bush's current administration.

3.2.1 Composite Filing Trends

It is prudent to evaluate case filing trends over a period of years as opposed to year-to-year. Abnormal spikes can occur year-to-year which may give the appearance of a crisis, or great improvement, in a particular type of filing.

The National Center for State Courts (2003) reports over the 10 year period from 1993 through 2002 total non-traffic state filings (civil, criminal, domestic, and juvenile) increased by 15% from 33.5 million to 38.5 million. However, this increase should not be considered without consideration of the adult population increase over the same time period. The U.S. Census Bureau reports the 18 and over (adult) U.S population increased by 12.8% from 191.5 million to 216 million over the same time period. Therefore, there were 174.9 non-traffic civil case filings per 1000 adults in 1993 and 178.2 non-traffic civil case filings per 1000 adults in 2002. This results in a minimal population adjusted total non-traffic case filing growth rate from 1993 through 2002 of 1.9%.

3.2.2 Civil Case Filing Trends

As previously discussed in this paper, civil cases are filed to deal with disputes. Simply stated, someone believes they were treated wrongly by someone else and is seeking redress or compensation. Civil cases can range from an individual filing a suit against a contractor for painting their fence the wrong color, to someone suing a toy manufacturer for product liability, to an automobile

manufacturer suing a construction company for late completion of a new assembly plant.

The National Center for State Courts (2003) reports there were 16.3 million civil cases filed in 2002, a 12% increase over the 14.6 million civil cases filed in 1993. Considering the adult populations in 1993 and 2002, there was respectively 76.2 and 75.5 civil case filed per 1000 adults in those years. Therefore, there was actually an adult population adjusted decrease of 0.9% in civil case filings from 1993 to 2002.

Interestingly, the National Center for State Courts (2003) reports civil case filings fluctuated up and down from 1993 through 2000, and then increased significantly in 2001 and 2002. Data shows there were 15 million civil cases filed in 2000 which calculates to 70 per 1000 adults. Therefore, there was an 8.7% increase in civil case filings from 2000 to 2002. In addition, there was an adult population adjusted civil case growth rate of 7.9% over those years.

Unfortunately, civil filing data specific to "construction" disputes could not be found. It does not appear that state courts track filings down to the industry level.

3.3 Litigation Trends in State Court

Hannaford-Agor, Ostram, and Strickland (2004) indicate data trends show a decline in trials for most federal case types. They sought to determine if the same was true for state courts. Data for federal cases is succinct and readily available, while they found many states have different case classification systems. Therefore, compiling state data for analysis was a delicate process.

Hannaford-Agor et al. (2004) found trial trends in state courts to be the same as federal courts. Both jury and bench trials declined despite growth in the total number of cases filed reaching disposition. Table 2 shows total civil dispositions in 22 states from 1976 through 2002. Only 22 states are included because only 22 states report the number of trials conducted for total civil cases from 1976-2002. The data shows from 1976 to 2002 an overall decrease in jury trials in the 22 states of 32% and bench trials of 7%. However, during this same time period total dispositions increased by 111%.

Table 2. Total Civil Dispositions in 22 States, 1976-2002 (Hannaford-Agor et al., 2004)

Year	Total Dispositions	Jury Trials	Bench Trials
1976	1,464,258	26,018	502,549
1980	1,873,462	23,073	603,471
1985	2,019,391	22,663	615,029
1990	2,828,182	22,387	610,741
1995	3,138,796	23,453	613,981
2000	2,999,012	21,937	528,104
2002	3,087,857	17,617	469,547
Percent Change (1976-2002)	111%	-32%	-7%

Hannaford-Agor et al. (2004) also studied general civil case trends in 10 states from 1992 through 2002. General civil cases involve tort, contract, and real property disputes. The 10 states included in the study were: Arkansas, California, Florida, Hawaii, Minnesota, New Mexico, North Carolina, Texas, Washington, and West Virginia.

Table 3 shows the total cases which reached a disposition declined 21% from 1992 to 2002. The total number of non-jury trials decreased proportionally by 21% as well. However, the total number of jury trials in the 10 states decreased by 44% over the same time period.

Table 3. General Civil Dispositions in 10 States, 1992-2002 (Hannaford-Agor et al., 2004)

Year	Dispositions	Jury Trials	Bench Trials
1992	633,170	11,224	26,972
2002	498,649	6,329	21,398
Percent Change	-21%	-44%	-21%

Hannaford-Agor et al. (2004) found the total number of cases which reached a disposition by trial was fairly consistent from 1992 through 2002. In 1992 and 2002, respectively, 6% and 5.6% of cases reached a decision by trial. Of the cases settled by trial, there was a slight decrease in the number of cases going to a jury from 1992 to 2002. The percent of trial cases settled by jury in 1992 was 29.4% while in 2002 was 22.8%. Conversely, the percent of cases settled by non-jury trial increased from 70.6% to 77.2% over the same years.

Chapter 4: Alternate Dispute Resolution

With the decline in number of cases going to trial, one may ask how the remaining cases are being disposed. Table 4 shows data on the manner of disposition for civil cases in 21 states during 2002. The National Center for State Courts (2003) data indicates 7.6% of cases reached disposition by trial. This data agrees with Hannaford-Agor et al. (2004) data discussed in chapter 3 where they found 5.6% of disposed cases went to trial in 10 states during 2002.

Table 4. Manner of Disposition of Civil Cases Filed in 21 State Trial Courts, 2002 (NCSC, 2003)

DISPOSITION		
Trial	**7.6%**	
Non-Trial	**92%**	
Default:		27%
Settle/Dismiss:		42%
Other:		23%

The data also shows one popular manner of reaching a disposition without going to trial is through settlement or alternative dispute resolution (ADR). When two parties have a dispute, they generally want the matter settled quickly, effectively, and at the least cost. In addition, they want a minimal amount of adversity, to preserve the relationship, and a settlement fair to both parties.

The nature of a civil trial does not lend itself to meeting any of these criteria. Civil trials are often not settled quickly but rather can take years to reach a verdict. The effectiveness of a civil trial can be questioned because those involved in the settlement (i.e. jury or judge) are so far removed from the actual events of the dispute. Fees for lawyers, experts, depositions, and other miscellaneous items add up quickly making a trial very costly. In addition, a trial can create a win-lose atmosphere which would forever damage the relationship between the parties.

4.1 Types of Alternate Dispute Resolution (Levin, 1998)

4.1.1 Arbitration

Arbitration is the ADR technique most similar to litigation. However, instead of presenting the case to a judge or jury, summary presentations are made by both sides to one or a panel of neutral arbitrator(s). Many of the same procedures used in litigation, such as discovery and preliminary motions, are used in arbitration. However, arbitrators have the power to direct those processes. Arbitration decisions are considered binding, unless previously agreed upon to be non-binding.

4.1.2 Mediation

Both parties select a mediator who assists the parties in reaching a mutually satisfactory resolution of the dispute. The mediator does not render a binding decision, but assists the parties in agreeing on a compromise. Once agreed in writing, the mediation results are binding.

4.1.3 Mediation-Arbitration

This is a hybrid of mediation and arbitration. Mediation is used to try to help the parties reach an agreement. However, if agreement can not be reached by the parties, the mediator becomes an arbitrator and renders a binding decision.

4.1.4 Mini-Trials

Formal presentations are made to a board or panel of executives from both parties. The parties are free to fashion their own rules and format. A non-binding decision is rendered by the panel, which is then used in direct negotiations between the parties.

4.1.5 Advisory Opinion

An independent, mutually appointed neutral meets with both parties to obtain information and issue a non-binding prediction of the ultimate outcome. The opinion is used in direct negotiations between the parties.

4.1.6 Other ADR Techniques

There are several other ADR techniques which fall into the category of non-binding advisory procedures. These include settlement judge, fact-finding, early neutral evaluation, dispute review boards, and other similar concepts. Simply stated, a third party is involved to help the parties resolve their dispute.

4.2 Use of ADR by Fortune 1000 Companies

A research team composed of members from PricewaterhouseCoopers, Cornell University, and the Foundation for the Prevention and Early Resolution of Conflict was formed for the sole purpose of studying the use of ADR amongst America's 1000 largest companies. Lipsky and Seeber (1998) authored the final report which concluded that ADR has made substantial inroads in the fabric of American Business.

Table 5 shows the majority of Fortune 1000 companies are open to some form of ADR. Only 5% and 6% of companies choose to always litigate if they are the defending or initiating party, respectively. This suggests the remaining companies have an open mind towards ADR. A number of companies have a policy to file litigation first and then try ADR. However, this could be merely published policy. If people knew a company policy was to always use ADR then they could possibly be more susceptible to frivolous lawsuits.

ADR usage varies by industry as well. The survey indicated the construction industry as a whole uses ADR most frequently with 70% of respondents reporting their firms use ADR most or all of the time. By contrast, 54% of the communication and utility companies indicate they prefer to litigate.

Table 5. Conflict Resolution Policies of Fortune 1000 Corporations (Lipsky and Seeber, 1998)

Strategy	Defending Party (%)	Initiating Party (%)
Always litigate	5	6.1
Litigate first, then ADR	24.7	21.4
Litigate when appropriate, ADR for all other	25.2	27
Always try ADR	11.7	11.3
No company policy	20.8	22.1
Other	12.6	12.1

Lipsky and Seeber (1998) report nearly all Fortune 1000 companies have had some experience with ADR with 87% having used mediation and 80% having used arbitration at least once in the past three years. In addition, they found across all companies corporate counselors overwhelmingly preferred mediation (63%) with arbitration a distant second (18%). However, the percentages are a function of the type of industry the company is engaged. Table 6 shows preference for ADR by type for several industries.

Table 6. Preferred (%) Use of ADR Procedures by Industry (Lipsky and Seeber, 1998)

Procedure	Mining / Construct.	Durable MFG.	Comm. / Utilities	Finance	Service
Mediation	60	70	63	63	50
Arbitration	30	16	19	17	17
Med-Arb	0	6	13	2	23
In-house grievance	0	5	4	2	10
Mini-trial	0	1	0	0	0
Fact-finding	0	1	0	6	0
Peer review	0	0	0	0	0
Ombudsperson	10	1	4	4	0

Regardless of industry type, there are certain types of disputes which companies prefer to resolve using ADR. Table 7 shows ADR use by type of dispute across all Fortune 1000 industries. Data in the table shows companies have a distinct preference to use ADR to solve employment and commercial/contract disputes.

Table 7. Percent of Fortune 1000 Companies Which Have Used Mediation and Arbitration by Type of Dispute (Lipsky and Seeber, 1998)

	Mediation (%)	Arbitration (%)
Employment	78.6	62.2
Commercial/Contract	77.7	85.0
Personal Injury	56.5	31.8
Construction	39.3	40.1
Product Liability	29.3	23.3
Real Estate	31.9	25.5
Environmental	30.6	20.3
Intellectual Property	28.6	21.0
Consumer Rights	24.1	17.4
Corporate Finance	13.3	12.3
Financial Reorganization	10.3	8.1

Another study conducted by Deloitte & Touche (Bickerman and Smoyer, 1997) concurs with the results of Lipsky and Seeber (1998) in regards to large company preference for mediation over arbitration. Their survey shows 65 percent of large companies prefer mediation, while only 28 percent favor arbitration. Bickerman and Smoyer (1997) found one reason for this reversal is the increasing realization that arbitration, in many instances, has become nearly as time-consuming and expensive as conventional litigation. Several responses to their survey indicated the discovery process in arbitration is just as time consuming as in litigation and delays are common. In addition, they found because arbitration is becoming so resource intensive it often undercuts, rather than promotes, efficient dispute resolution. As an additional consideration against

using arbitration, they found companies do not like binding arbitration because it carries a risk beyond litigation. Just like litigation, both parties surrender control to a third party; however, unlike a judges decision, an arbitrators decision is only appealable in limited circumstances.

4.3 Use of ADR by the U.S. Federal Government

The Federal Government spends hundreds of billions of dollars annually on goods and services. It is logical to presume those transactions involve a number of disputes between manufacturers or service contractors, and the various federal agencies who contract with them.

The Federal Government's position is it supports and promotes the use of ADR. The ADR Act of 1990 encouraged the use of ADR techniques to resolve federal contract disputes. Six years later, as documented by the Federal Alternative Dispute Resolution Council in the Federal Register, The Alternative Dispute Resolution Act of 1996 required federal agencies to promote ADR. In addition, a Presidential Memorandum dated 1 May 1998 created an interagency ADR working group chaired by the Attorney General. However, the Federal Government does not specify any single of type of ADR.

4.4 Cost Savings Using ADR

In general, when legal services are purchased the total cost is not known until the final bill is received. There are some specialty legal services such as drafting a will or real estate transaction fees which can be pre-priced, but it would be impossible to know exactly what it would have cost to litigate a product liability case. Therefore, it would be impossible to state an exact cost savings by using ADR over litigation.

In an attempt to establish a range of cost savings using ADR rather than litigation, Deloitte and Touche Litigation Services (Papoutsy, n.d.) surveyed the general council of Fortune 100 companies as well as a number of attorneys specializing in litigation. The survey did not distinguish between ADR methods. This chapter has already indicated that some feel arbitration can cost almost as much as litigation, while an advisory opinion would certainly cost much less. The survey does distinguish between those who have used ADR, extensive users of ADR, and attorneys. Arguably those with extensive ADR experience should have the most accurate grasp of savings from using ADR.

Table 8 shows the results of the survey. One interesting observation from the data is roughly one third of both corporate and law firm attorneys believe ADR does not save money, while only 12% of extensive ADR users feel the same. A cynical person might speculate more attorneys responded in this manner solely because they stand to benefit financially from litigation. Some attorneys may

have responded in this manner because they dislike the loss of control required in ADR use. While there may be cost savings from using ADR processes, attorneys may consider the opportunity cost in what could have been won in court. On the other hand, the fact that the majority of attorneys indicated at least some savings from ADR can not be overlooked. However, also of note, a concentrated 47% of ADR users, 56% of extensive ADR users, 42% of company counsels, and 50% of law firm attorneys indicate ADR saves between 11 to 50% over litigation. Therefore, it would not be unreasonable to say ADR saves between 11 and 50% over litigation costs with the range a function of the type of ADR used and the specifics of the cases.

Table 8. ADR Cost Savings as a Percent of the Cost of Litigation (Papoutsy, n.d.)

Savings (%)	ADR Users (%)	Extensive ADR Users (%)	Company Counselors (%)	Law Firm Attorneys (%)
None	33	12	35	32
1 – 10	2	0	1	3
11 – 20	8	8	10	7
21 – 30	11	12	8	13
31 – 40	8	16	7	8
41 – 50	20	20	17	22
51 – 60	5	4	6	5
61 – 70	1	4	1	1
71 – 80	7	8	10	5
81 – 90	1	4	1	1
91 – 100	4	12	4	3
Total:	100	100	100	100

Chapter 5: Use of ADR in the Construction Industry

5.1 Construction Disputes

Construction disputes are generally contract related so construction lawsuits fall in the filing category of civil suits. Chapter 3 of this paper discussed civil case filing trends in state courts from 1993 - 2002. While public perception, probably due to media coverage of high profile civil cases, is that civil case filings are out of control, data actually shows a population adjusted decrease of 0.9% in civil case filings from 1993 – 2002. However, there was a population adjusted increase of 7.9% in civil case filings from 2000 – 2002. Since the general category of civil filings is quite large, those with an interest in the construction industry may inquire about the state of construction related filings. Unfortunately, data on solely "construction" findings could not be located. It does not appear states track filings down to the industry level.

However, based on a survey of construction industry leaders, it does not appear that construction dispute filings are declining. On the contrary, construction leaders indicate contract disputes are a significant problem for the industry. Deloitte and Touche (Roffman, 2003) surveyed 350 senior executives in the real estate and construction industry and almost 50% reported an increase in construction related disputes over the last few years.

With the advances in web based construction management applications being put into use, it could logically be speculated that the number of construction disputes should be decreasing. However, the Deloitte and Touche (Roffman, 2003) survey indicates construction executives feel web based collaboration is only effective about 25% of the time. Executives feel that despite the development of web-based collaboration tools, traditional gaps between owner, architect and contractor have yet to be narrowed. One survey responder indicated despite the fact that 40% of the industry utilizes the tools, they have been slow to penetrate the industry in a meaningful, industry-changing fashion as far as thwarting and resolving disputes are concerned.

One may ask what is different about construction which makes it so confrontational and have a high potential for disputes? The answer is construction is procured and completed in a manner which lends itself to numerous potential disputes. The process includes an owner's vision, selection and completion of a formal design, selection of a construction team which usually includes many specialty subcontractors, actual construction, and ultimately building commissioning and turnover. Depending on the type of facility constructed, the whole process can take years. During this time personnel will change, the economy will change, and technology will change. With almost 100% certainty, the only thing that won't change is the fact that something will not go according to plan during the project and a dispute will arise.

A study in 1984 by Diekmann and Nelson evaluated the causes of construction claims which were resolved prior to litigation or with the use of ADR. Table 9 lists the causes and frequency of those claims.

Table 9. Summary of Construction Claim Causes (Diekmann and Nelson, 1984)

Cause	Frequency (%)
Design Errors	39
Changes	30
Differing Site Conditions	15
Weather	7
Value Engineering	4
Strike	1
Other	4
Total:	100

Kilian (2003) summarized the primary causes of litigation resulting from construction claims at the Naval Facilities Engineering Command (NAVFAC) from 1982-2002. Table 10 displays his findings.

Table 10. Primary Causes of Litigation at NAVFAC, 1982-2002 (Kilian, 2003)

Primary Cause	# of Cases
Contract Interpretation	174
Delays	77
Disputes	74
Performance	54
Modifications	52
Site Conditions	46
Quality	29
Defaults	26
Liquidated Damages	23

Table 9 lists causes of disputes which were resolved before litigation and Table 10 lists disputes which were litigated. However, both have a common denominator of a situation where a disagreement led to a dispute. The only common one amongst the two lists is site conditions, so the two tables combined would produce a lengthy list of possible dispute causes during construction. Unfortunately for the industry, there are more than listed on the two tables.

5.2 Cost to Litigate a Construction Dispute

The nature of ADR lends itself to be more emotionally sensitive than litigation. Litigation can have a take-no-prisoners or winner-take-all approach, while ADR uses more of a compromising approach. However, there is more than an emotional justification to use ADR over litigation. That justification is cost and time savings.

In 1994 (O'Neal and Stipanowich), the American Bar Association Construction Forum undertook a study to determine the "approximate average cost" to litigate a construction dispute. Table 11 show litigation costs range from an average of about 13% to 35% of the amount at issue. Also, considering this survey was taken ten years ago, no doubt costs have gone up. Therefore, if ADR costs are less than litigation costs, then it makes economic sense to pursue ADR.

Table 11. Cost to Litigate a Construction Dispute, 1994 (O'Neal and Stipanowich, 1995)

Nature of Dispute	Amount at Issue ($)	Average Estimated Cost ($)	Median Estimated Cost ($)
Discovery intensive claim alleging contract changes	100,000	28,900	25,000
	250,000	49,500	50,000
	500,000	79,600	75,000
	1,000,000	128,600	125,000
Discovery intensive delay claim	100,000	35,600	30,000
	250,000	60,600	50,000
	500,000	91,100	75,000
	1,000,000	149,500	150,000

5.3 Dispute Prevention and Resolution as a form of ADR

The Construction Industry Institute (1995) identified five stages of the construction claims process:

1. Problem
2. Disagreement
3. Dispute
4. Conflict
5. Litigation

One goal of construction project management should be to solve problems and disagreements at the lowest possible level in the project management structure. It is widely recognized that resolution at the lowest level is the cheapest and most effective manner to resolve issues. This ADR technique is called dispute prevention because on-site project participants are preventing the issue from becoming a dispute. In the event the issue can not be solved between the on-site parties and it becomes a dispute, then the ADR technique of dispute resolution should be implemented. Beyond this, the ADR techniques discussed in Chapter 4 must be used with the worst case of solving the problem using litigation.

5.3.1 Project Partnering

The Construction Industry Institute (1995) advocates project partnering to aid in dispute prevention by solving problems and disagreements. Project partnering is a formal commitment between the contracting parties to achieve specific business objectives. A relationship is established which is based on trust

and mutual understanding of the other's expectations and values. The partnership should create an atmosphere whereby both parties are able to discuss and work out their issues.

5.3.2 Dispute Review Boards

In the event a dispute can not be prevented, the Construction Industry Institute (1995) recommends the use of dispute resolution techniques. One dispute resolution technique advocated by the Construction Industry Institute (1996) is the Dispute Review Board. The Construction Industry Institute has developed an implementation resource, IR 23-2, to aid companies in the establishment and use of dispute review boards.

Three members typically make up the Dispute Review Board. The owner and contractor each nominate a board member that the other party must approve. The two approved board members then jointly select the third member, also approved by the owner and contractor. The three board members meet regularly throughout the project duration in order to issue non-binding recommendations for dispute resolutions. CII recommends the DRB be organized shortly after contract award and ongoing involvement for the board members throughout the construction period.

5.4 Conflict Resolution

In the event disputes can not be prevented though partnering or resolved using dispute review boards, then further ADR methods should be employed. The Construction Industry Institute (1995) identifies conflict resolution techniques as those aimed at reaching a negotiated or adjudicated resolution when dispute prevention and resolution techniques are not effective. The most often referenced techniques are covered in Chapter 4.1 of this report.

Table 6 of this report shows a 60% preference for mediation and a 30% preference for arbitration among Fortune 1000 companies whose primary business is construction. That calculates to a combined preference of 90% for either mediation or arbitration. Therefore, this report will focus further on evaluating the use of mediation and arbitration to resolve construction conflicts.

5.5 Construction Mediation

Mediation is arguably becoming the panacea for resolving construction disputes. According to the President and CEO of the American Arbitration Association (Slate, 2002), several studies indicate the average rate of settlement is in the neighborhood of 85%. The concept of mediation is quite simple. The mediator hears the position of both parties, and then guides them to achieving a settlement acceptable to both parties. The mediator is a facilitator and not a judge. They do not decide who is right or wrong according to construction law. There is

not a win-lose or winner-take-all atmosphere. Ideally the mediator is able to help both parties understand the position of the other, and make concessions in consideration of those positions.

5.5.1 Primary Benefits of Mediation

According to Kelsey (n.d.), the primary benefit of mediation is risk and cost control. The parties to the dispute maintain control of the entire process. Other than paying for their share of mediation costs, which relative to the amount of many construction disputes is minimal, there is really no risk in at least trying mediation. If an agreement can not be reached, then the parties will move on to some other settlement method. In addition, both parties control the terms of the settlement. As opposed to arbitration or litigation, an award is not imposed by an arbitrator, judge, or jury.

5.5.2 Mediator Selection

Choosing the right mediator can be the most important step in the mediation process. According to Lurie (2002), ideally the mediator should be a respected authority for the construction dispute matter. For example, if the issue is labor productivity or schedule/delay related, then someone experienced in mediating those types of disputes should be sought. Experience and track record are important as well. The mediator should supply a list of references. Also, the

mediator's style should be evaluated. Some mediators enjoy a sense of power and may try to play the role of judge rather than facilitator. Harris (2001) argues that a mediator skilled in bringing parties to a resolution outweighs knowledge in the construction process.

5.5.3 Ensuring a Successful Mediation

Over time common reasons for mediation failure have emerged. Bertram (1998) has summarized a "top-ten" list outlining actions to be taken to help ensure successful construction mediation.

1. Empower participants – Send someone with the authority to settle.
2. Demonstrate good faith – Participate with the intention of resolving the differences.
3. Select the right mediator.
4. Provide the mediator with a summary of your position in advance of the mediation.
5. Alert the mediator to special problems in advance of the mediation.
6. Avoid inflammatory or confrontational statements in joint mediation sessions with the other party.
7. Do not try to deceive the mediator.
8. Expert witnesses can be a burden at mediation.

9. Substantiate all claims with contracts, correspondence, and relevant documents.
10. Immediately sign a settlement memorandum after mediation

5.5.4 Mediate with Caution

It appears there is a lot of hype associated with the mediation of construction disputes. Success rates are high, participants like having more control in the outcome, and the process can be relatively quick. However, Loulakis (2004) advocates a few considerations before rushing into mediation. First, formal mediation may not be necessary. If both parties are interested in settling and at a stage where they are ready then old fashioned negotiations may be better. While usually not overly lengthy or costly, mediation does involve some time and cost which could be avoided. Second, be cautious about going to mediation too early. Some advocate mediation as early as possible, but Loulakis (2004) has found both parties want to be smart on facts and not blind in the agreement. Third, avoid mediators whose sole goal is to settle the case. Consideration needs to be given to the merits of each side. Finally, be wary of baseless requests for mediation. Much as with personal injury attorneys suing insurance companies because it is cheaper to settle than litigate, unscrupulous contractors may try the same with mediation. They reason that owners would rather mediate a settlement than go to court.

5.6 Construction Arbitration

Arbitration is the ADR method most like litigation. However, rather than making presentations to a judge or a jury, presentations are made to an arbitrator or arbitration panel which is selected by the contract parties. The arbitrators will have knowledge and experience in construction management principles, and this is considered one of the major benefits of arbitration. The parties set the rules of arbitration in their contract. In general, the arbitrator's decision is final; however, both parties can agree to specific arbitration rules before signing their contract. They may decide to have non-binding arbitration, and also put stipulations on the use of standard parts of the litigation process such as discovery and evidence.

5.6.1 Arbitrator Selection

Just as with mediation, the part of the construction arbitration process which is probably considered to be most critical is arbitrator selection. It is best practice to use arbitrators with strong knowledge and experience in the construction industry. The contract should outline the specifics of choosing the arbitrator. There are many considerations such as years of experience, composition of panel (i.e. number of lawyers, engineers, architects, etc) and actual method of selection (i.e. whether to use the AAA pool of arbitrators) (Harris, 2001). In response to requests for specially acknowledged, highly experienced arbitrators the American Arbitration Association has created a Construction

Arbitrator Master Panel ("American Arbitration Association announces," 2004). The arbitrators in this pool meet specific criteria which places them in an elite status.

5.6.2 Arbitration and Contracts

A common contract template used in construction is the American Institute of Architect's Standard Form Contract. This contract incorporates binding arbitration under the auspices of the American Arbitration Association's (AAA) Construction Industry Arbitration Rules (Harris, 2001). The Associated General Contractor's standard form contract includes arbitration as an option to be selected by the parties (Harris, 2001).

A lot of contracts and subcontracts are used in the construction industry. Subcontractors should be aware of arbitration clauses in their contracts with the prime contactor. In addition, they should be aware how arbitration decisions against the prime contractor may affect them. Smith and Zarlenga (2004) report a number of cases have arisen that expressly hold that a nonsignatory or nonparty may be bound to an arbitration award. In Cecil's Inc. v Morris Mech. Enters. Inc., 735 F.2d 437, Cecil as prime contractor and the owner developer went to binding arbitration over faulty HVAC installation at a new apartment complex. The arbitration panel awarded damages to the developer. Cecil filed suit to uphold the award against its subcontractor, Morris Mechanical Enterprises. The district court

confirmed that Morris was responsible for the damages; however, Morris appealed arguing he could not be held to an arbitration award in which he was not a party. Morris lost his appeal.

5.6.3 Limiting Arbitration Awards

As with any legal decision, an area of concern in arbitration is the final decision and award amount. Since arbitration decisions are often final and not appealable, except in cases where law was misapplied or case facts were wrong, an owner or contractor may want to limit damage exposure up front. A typical construction contract arbitration clause does not address or limit damages an arbitrator may award. Therefore, Sink (2002) recommends in large and complex construction projects, with significant risk and potential for substantial damages, a clause is included which limits awards. Clauses could address such matters as consequential damages, profit, home office overhead damages, interest, arbitration and attorney fees, and punitive damages.

5.6.4 Dissatisfaction with Arbitration

Arbitration has obvious benefits over litigation. However, there are some who believe it is quickly losing its appeal as an informal, fair, and swift process. Harmon (2004) indicates arbitration is becoming a slow laborious process akin to litigation in terms of procedure and cost without the safeguard of litigation.

Parties are spending a lot of money on discovery, and using expert witnesses and consulting experts to analyze documents and schedules. In addition, Hobbs (1999) highlights prolonged delays in selecting arbitrator panels, hearing dates and places, and in preparing for arbitration hearings. Hearing times are increasing and discovery procedures are becoming much like litigation. Also, there is frustration that arbitrators are not adequately controlling the hearings and allowing too many witnesses and documents. Lastly, arbitrator decisions have potential to be somewhat arbitrary as they are not bound by case law. Since arbitration decisions are not appealable, this can be a source of frustration to those used to working with legal precedents.

Chapter 6: Case Studies in the Use of ADR in Construction

6.1 Mediation Case Study (Morgerman, 1996)

Following is a case study analysis of an actual construction mediation. It demonstrates how despite extreme opposing initial positions, the mediator was able to get each side to understand the others position and ultimately reach an acceptable settlement.

Project: Construction of one school building and renovation of an adjoining school building at a university in New York City.

Claimant and Position: Trade Contractor – Monetary claim for lost labor productivity because of excessive change orders, stacking of trades, defective drawings, and poor planning by respondent's construction manager.

Respondent and Position: The University – The contract contained a 'No Damage for Delay' clause which states "any claim for damages on account of any delay, obstruction or hindrance for any cause whatsoever...and agrees that its sole right and remedy...shall be an extension of time fixed for completion of the work."

Amount of Dispute: $1,000,000 (approximately)

Initial Mediation Opening Meeting: The contractor's group included the company president, project superintendent, project manager, the president of a construction claims consulting firm, and a construction attorney. The University was represented by its director of plant operations and outside counsel. Both sides made summary presentations. The contractor's claim consultant put on a dog-and-pony show describing their lost productivity claim. The University's attorney responded with one statement, "No Damage for Delay means no damages, period." It was obvious the mediation was going nowhere fast, so the mediator moved on to private meetings with both parties.

Initial Mediation Private Meeting with Respondent: The University's attorney was not a construction attorney so the mediator had to explain that lost productivity claims in construction are valid. In addition, despite the No Damage for Delay Clause, similar cases have been successfully litigated. It was important for the mediator to do this in a delicate manner so as to develop and maintain trust and respect from the University's attorney. Without trust in the mediator, the mediation may fail.

Initial Mediation Private Meeting with Claimant: The mediator had to tactfully convince the contractor that they would need to come down from their initial position. Upon closer review of the claim, an error was found. The lost productivity analysis had been applied to change order work for which the contractor had been paid actual expenses.

Initial Mediation Closing Meeting: At the end of the day both parties met, but it was evident that settlement was not going to happen in one day. The mediator suggested he look over the position of both sides closer, and he would propose a settlement number. Of note, normally a mediator will not suggest a number but rather attempt to get both sides to negotiate amongst themselves. However, in this situation the mediator felt the case was headed to litigation unless he aggressively intervened.

Follow-up Meeting with Respondent: The mediator felt he needed to have a special meeting solely with the University. He believed the University needed a better understanding of construction law, case precedents, and the concept of lost productivity. A review of the project files indicated frequent changes which created contractor inefficiency. Most revisions were to the original contract drawings which created in effect a 'fast-track' project because the building was being designed during construction. The mediator informed the University that

had they solicited the project as 'fast-track' the bids would have been higher initially due to expected inefficiencies. The A/E was interviewed and admitted excessive changes, defective drawings, hidden conditions, poor performance by other contractors, and a construction manager who created stop and go conditions which delayed the project eight months.

Second Mediation Meeting: One month following the initial mediation meeting, both sides met again. The mediator met privately with the contractors and was able to convince them while their claim had merit, it did contain some errors and the University was not responsible for lost productivity associated with repair of the contractor's construction defects. A 'settlement range' was proposed which the contractor agreed to.

A private meeting with the University revealed they accepted the legitimacy of lost productivity and were no longer so confident in the No Damage for Delay Clause defense. They discussed the risk of not settling and the costs of litigation. The University made an offer which was 1/3 of the low figure of the mediator's settlement range. However, the mediator did not present it to the contractor because he believed it to be more of a "please accept this and go away" offer rather than legitimate compensation for damages. In addition, he believed the contractor would be so offended by the offer that he would end mediation and go straight to litigation.

Final Mediation: The following month the mediator put together some more analysis of the contractor's claim on labor hours and inefficiency rates used as its basis. The University doubled it offer, but was still not at the low end of the range acceptable to the contractor. The mediator presented it to the contractor and it was rejected; however, the contractor wanted to keep trying. A few weeks later the University made another offer which was at the bottom end of the range and was accepted by the contractor.

6.2 Arbitration Case Study

Arbitration, unlike litigation, is always conducted in private. Awards and opinions are only published if all parties involved in the dispute give their consent. It is clear that not a lot are published as a formal arbitrator's decision could not be located. In general, an arbitrator's decision is final and not appealable. However, there are cases where a pre-arbitration agreement states an arbitrator's decision is appealable to the courts. Such is the case in John T. Jones Construction Co. v. City of Grand Forks, North Dakota (2003). The following analysis of the case comes from the case citation; however, the arbitrator's final decision and details of the arbitration are not included.

Project: Expansion of the wastewater treatment plant in Grand Forks, ND.

Contract Type: Firm-fixed priced based on drawings prepared by Grand Forks' hired A/E firm.

Contract Start Date: November, 1998

Contract Completion Date: November 15, 1999. Note: Contract stated final completion date is "of the essence."

Actual Completion Date: March 20, 2000

Liquidated Damages Clause: $800 per day

Contractor's Position: Jones claims he encountered soft soils at the construction site and the soil began heaving. He states the top layers of soil in his excavation shed down the slopes. Jones claims this condition is due to unanticipated soil conditions, and citing the contract's differing site conditions clause requests $191,570.59 from the City.

City of Grand Forks' Position: The City disagrees with Jones and feels Jones's work does not meet contract specifications.

Legal Actions: In May 2000, Jones sues the City of Grand Forks for breach of contract. The City counterclaims and seeks liquidated damages because Jones did not finish the project by the contract completion date.

Arbitration Guidelines: In April 2001, Jones and the City of Grand Forks entered into, and the trial court signed, a "Stipulation and Order for Restricted Arbitration." The parties agreed the arbitration proceedings would be governed by the North Dakota Rules of Civil Procedure and the North Dakota Rules of Evidence, and the arbitrator would "make a reasoned and written determination as to liability and damages that conforms to the substantive law of the State of North Dakota." The parties also agreed the arbitrator's decision would be appealable based on issues of fact and issues of law. In other words, appeal would not be allowed just because one party did not like the arbitrator's decision.

Arbitration Results: The arbitration itself lasted 8 days. The arbitrator issued a 33 page decision ruling that Jones was not entitled to additional compensation or a time extension under the differing site conditions clause because Jones had failed to establish the conditions at the site were "an unknown physical condition, were of an unusual nature, or that conditions differed materially from those ordinarily encountered." The arbitrator further ruled the City of Grand Forks was

entitled to recover liquidated damages. Further more, the arbitrator ruled each party would have to bear its own arbitration costs and attorney fees.

Arbitration Appeal: As odd as it seems, both sides appealed the arbitrator's ruling. Jones appealed citing the arbitrator errored in application of the law in ruling he did not provide sufficient evidence of differing site conditions. Jones' appeal is probably to be expected; however, the city appealed the arbitrator's decision that the City has to pay its own arbitration costs and attorney fees.

Appeal Ruling: The Supreme Court affirmed the arbitrator's ruling.

Chapter 7: Conclusions

The findings in this report lead to the conclusion that alternate dispute resolution methods are powerful and effective tools. In the majority of cases, both parties to a construction dispute benefit greatly when ADR is used instead of litigation. While litigation has its place, in most cases ADR offers cheaper, faster, and more effective methods to resolve construction disputes.

Public perception is U.S. courts are being swamped with civil case filings; however, data does not show this to be the case. Population adjusted civil case filings are actually down slightly from 1993 – 2002. Unfortunately data on the specific number of construction lawsuit filings could not be located as states do not seem to track filings by industry type.

There are a number of ADR methods which employ a third party neutral to aid the disputing parties in resolving their dispute. The majority of Fortune 1000 companies are open to ADR, and most prefer mediation followed by arbitration. The federal government encourages and promotes the use of ADR.

Partnering and dispute review boards are advocated as a means of dispute prevention and resolution. If further ADR is required, mediation or arbitration is preferred by 90% of the Fortune 1000 companies whose primary business is construction. This is in part because there are proven cost savings by using ADR instead of litigation.

Parties must consider the use of alternate dispute resolution instead of litigation to resolve their disputes. A company may have sound reasons why it prefers litigation over settlement. However, if at all possible, why not at least try to solve differences in a more cost effective and timely manner under terms which the parties agree rather than have decided for them? If alternate dispute resolution does not work, then litigation can be pursued.

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